

## (k) ABSTRACT OF THE DISCLOSURE

A method of producing an actuator includes shaping a block of ferroelectric material to provide an active element of the actuator. The element includes a stack of ferroelectric  
5 layers with adjacent layers separated by electrodes arranged parallel to end faces of the element. The method includes applying a primary electrode to the end faces, immersing the element and the primary electrode within a dielectric fluid, applying a primary poling voltage to the primary electrode so as to polarize the element in a first polarization direction, applying a secondary external electrode to side faces of the element, and applying a  
10 secondary poling voltage to the secondary electrode to polarize alternate layers along the first polarization direction and the other layers along a second, oppositely-directed polarization axis. The method may also include applying a conductive film to the end faces and/or applying heat to help evaporate the dielectric fluid.